

DISTRIBUTION:
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November 4, 1982

Marshall E. Miller, Esq., Chairman
 Administrative Judge
 Atomic Safety and Licensing Board
 U.S. Nuclear Regulatory Commission
 Washington, DC 20555

Dr. Kenneth A. McCollom
 Administrative Judge
 Dean, Division of Engineering,
 Architecture and Technology
 Oklahoma State University
 Stillwater, OK 74078

Dr. Richard Cole
 Administrative Judge
 Atomic Safety and Licensing Board
 U.S. Nuclear Regulatory Commission
 Washington, DC 20555

In the Matter of
 Texas Utilities Generating Company, et al.
 (Comanche Peak Steam Electric Station, Units 1 and 2)
 Docket Nos. 50-445 and 50-446

Dear Administrative Judges:

As indicated in the attached Supplemental Board Notification (No. 82-116), the matter identified in Board Notification 82-90 is still unresolved insofar as Comanche Peak is concerned. The Staff will continue to inform the Board of progress toward resolution of this matter. Until further information is developed, it is not clear whether the matter referred to in this Board Notification has a significant relationship to the issues in controversy in this proceeding.

Sincerely,

Marjorie U. Rothschild
 Counsel for NRC Staff

Attachment: As stated

cc w/attachment: Service List

DESIGNATED ORIGINAL

OFC : OELD *mur* : OELD : : : : :
 NAME : Rothschild/ed Treby : : : : :
 DATE : 11/4/82 : 11/4/82 : : : : :

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UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

NOV 4 1982

Docket Nos.: 50-445
and 50-446

MEMORANDUM FOR: The Atomic Safety and Licensing Board for Comanche
Peak Steam Electric Station, Units 1 and 2

FROM: Thomas M. Novak, Assistant Director
for Licensing
Division of Licensing, NRR

SUBJECT: BOARD NOTIFICATION - WELDS IN MAIN CONTROL PANELS
AT COMANCHE PEAK (BOARD NOTIFICATION NO. 82-116)

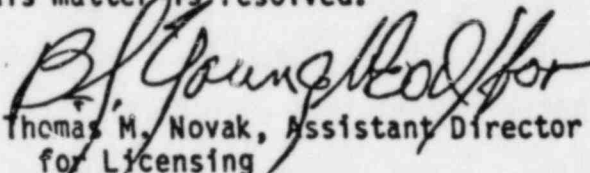
By Memorandum dated September 8, 1982 from Thomas M. Novak, Assistant Director for Licensing, to the Comanche Peak Licensing Board (and other licensing boards), the NRC Staff provided a Board Notification - "Welds in Main Control Panels" (No. 82-90). (Copy enclosed) According to the Board Notification, the information provided may have applicability to all dockets with control panels supplied by Reliance Electric of Stone Mountain, Georgia and several other vendors. The Board Notification enclosed IE Information Notice 82-34, "Welds in Main Control Panels," August 20, 1982, which described a number of weld deficiencies which raise questions about the ability of the control panels to perform their safety function during a seismic event. IE Information Notice 82-34 listed Comanche Peak Units 1 and 2 as a site at which defective welds in control panels had been identified. IE Information Notice 82-34 also indicated that the Staff expected licensees to review the information presented in the notice for applicability to their facilities.

By memorandum dated October 22, 1982 from Thomas M. Novak to the affected licensing boards the NRC Staff provided a supplemental Board Notification - "Welds in Main Control Panels" (No. 82-90A) which enclosed IE Information Notice No. 82-34, Rev. 1: "Welds in Main Control Panels." (Copy enclosed) IE Information Notice 82-34, Rev. 1 identified the specific time period during which the potentially significant problem pertaining to welds in main control panels may have existed.

During the period of September 7-13, 1982, the Staff conducted a routine unannounced inspection at Comanche Peak. In addition to other matters, the NRC inspector examined the licensee's actions taken in response to IE Information Notice No. 82-34. The inspector's report, "NRC Inspection Report: 50-445/82-19," was transmitted to the Applicants by a letter dated October 6, 1982. (Copy enclosed). The NRC inspector noted, "It was apparent that TUGCO had previously performed an examination as the QA/QC supervisor knew the location of several weld discrepant conditions and readily pointed them out to the NRC inspector." The NRC inspector also listed anomalies observed during this inspection. The NRC inspector concluded that until future actions are taken by the licensee, this

NOV 4 1982

matter will be considered an unresolved item (unresolved items are matters about which more information is required in order to ascertain whether they are acceptable items, violations, or deviations). At this time, the licensee has not provided the information necessary to resolve this item. The NRC Staff will provide additional information to the Board when this matter is resolved.


Thomas M. Novak, Assistant Director
for Licensing
Division of Licensing, NRR

Enclosures:

As Stated

cc: Board/Licensee Service List

DISTRIBUTION FOR BOARD NOTIFICATION

Comanche Peak Units 1&2/ALAB
Docket Nos. 50-445/446

Alan S. Rosenthal, Esq.
Dr. W. Reed Johnson
Thomas S. Moore, Esq.
Marshall E. Miller, Esq.
Dr. Kenneth A. McCollom
Dr. Richard Cole
Lucinda Minton, Esq.
Mrs. Juanita Ellis
David J. Preister, Esq.
Nicholas S. Reynolds, Esq.
Mr. Lanny Alan Sinkin

Atomic Safety and Licensing Board
Panel
Atomic Safety and Licensing Appeal
Panel
Docketing and Service Section
Document Management Branch

ACRS Members

Dr. Robert C. Axtmann
Mr. Myer Bender
Dr. Max W. Carbon
Mr. Jesse C. Ebersole
Mr. Harold Etherington
Dr. William Kerr
Dr. Harold W. Lewis
Dr. J. Carson Mark
Mr. William M. Mathis
Dr. Dade W. Moeller
Dr. David Okrent
Dr. Milton S. Plesset
Mr. Jeremish J. Ray
Dr. Paul G. Shewmon
Dr. Chester P. Siess
Mr. David A. Ward

Mr. R. J. Gary
Executive Vice President and
General Manager
Texas Utilities Generating Company
2001 Bryan Tower
Dallas, Texas 75201

cc: Nicholas S. Reynolds, Esq.
Debevoise & Liberman
1200 Seventeenth Street, N. W.
Washington, D. C. 20036

Spencer C. Relyea, Esq.
Worsham, Forsythe & Sampels
2001 Bryan Tower
Dallas, Texas 75201

Mr. Homer C. Schmidt
Manager - Nuclear Services
Texas Utilities Services, Inc.
2001 Bryan Tower
Dallas, Texas 75201

Mr. H. R. Rock
Gibbs and Hill, Inc.
393 Seventh Avenue
New York, New York 10001

Mr. A. T. Parker
Westinghouse Electric Corporation
P. O. Box 355
Pittsburgh, Pennsylvania 15230

David J. Preister
Assistant Attorney General
Environmental Protection Division
P. O. Box 12548, Capitol Station
Austin, Texas 78711

Mrs. Juanita Ellis, President
Citizens Association for Sound
Energy
1426 South Polk
Dallas, Texas 75224

Mr. Robert G. Taylor
Resident Inspector/Comanche Peak
Nuclear Power Station
c/o U. S. Nuclear Regulatory
Commission
P. O. Box 38
Glen Rose, Texas 76043

Mr. John T. Collins
U. S. NRC, Region IV
611 Ryan Plaza Drive
Suite 1000
Arlington, Texas 76011



UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555

SEPTEMBER 8 1982

Docket Nos. 50-445/446, STN 50-483, 50-528/529/530
and 50-322, 50-395, 50-387/388

MEMORANDUM FOR: The Atomic Safety & Licensing Boards for:

Comanche Peak Steam Electric Station, Units 1 & 2
Callaway Plant, Unit 1
Palo Verde Nuclear Generating Station, Units 1/2/3
Shoreham Nuclear Power Station, Unit 1

and The Atomic Safety & Licensing Appeal Boards for:

Virgil C. Summer Nuclear Station, Unit 1
Susquehanna Steam Electric Station, Units 1 & 2

FROM: Thomas M. Novak, Assistant Director
for Licensing
Division of Licensing

SUBJECT: BOARD NOTIFICATION - WELDS IN MAIN CONTROL PANELS
(Board Notification No. 82-90)

In accordance with present NRC procedures regarding Board Notifications, the enclosed information is being provided for your information as constituting new information relevant and material to safety issues. This information is generic and may have applicability to all docket with control panels supplied by Systems Control of Iron Mountain, Michigan; Reliance Electric of Stone Mountain, Georgia; and Comsip of Linden, New Jersey.

This information notice describes a number of weld deficiencies which raise questions as to the ability of the control panels to perform their safety function during a seismic event.

A handwritten signature in cursive script, appearing to read "E. L. Hansen".

Thomas M. Novak, Assistant Director
for Licensing
Division of Licensing

Enclosure:
As stated

cc: Board Service List
Licensee Service List

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UNITED STATES
NUCLEAR REGULATORY COMMISSION
WASHINGTON, D. C. 20555



AUG 23 1982

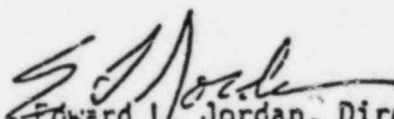
MEMORANDUM FOR: Darrell Eisenhut, Director of Licensing, NRR
FROM: Edward L. Jordan, Director, DEQA, IE
SUBJECT: PROPOSED BOARD NOTIFICATION DEFICIENCIES IN WELDS IN
MAIN CONTROL PANELS

The enclosed IE Information Notice No. 82-34, "Welds in Main Control Panels" describes a number of weld deficiencies that have been uncovered. We believe the information is material and relevant since the deficiencies raise questions as to the ability of the control panels to perform their safety function during a seismic event.

Panels have been shipped to a large number of plants, as listed on page 2 of the Information Notice. Of the plants listed as having known deficiencies, the following are listed in Mr. Christenbury's memorandum of August 2, 1982 as having cases pending before the commission, appeal boards or licensing boards: Syron 1 and 2, Braidwood 1 and 2, Midland 1 and 2, Callaway 1, and Comanche Peak 1 and 2.

Of those plants having panels manufactured by the vendors, the following have cases pending: Wolf Creek; Seabrook; Palo Verde 1, 2, and 3; Susquehanna; Three Mile Island 1; Salem 1; Hope Creek; Perry 1 and 2; Indian Point 2; Shearon Harris 1, 2, 3, and 4; St. Lucie 2; Shoreham; Virgil Summer; Marble Hill 1 and 2; Dresden; and Clinton.

In view of the potential safety significance of this issue, we recommend that the appropriate boards be notified.


Edward L. Jordan, Director
Division of Engineering and
Quality Assurance
Office of Inspection and Enforcement

Enclosure: As stated

cc/w enclosure:

R. DeYoung, IE
J. Sniezek, IE
M. Williams, NRR
R. Baer, IE
M. Wegner, IE

R. Haynes, Region I
J. O'Reilly, Region II
J. Keppler, Region III
J. Collins, Region IV
R. Engelken, Region V

UNITED STATES
NUCLEAR REGULATORY COMMISSION
OFFICE OF INSPECTION AND ENFORCEMENT
WASHINGTON, D. C. 20555

August 20, 1982

IE Information Notice No. 82-34: WELDS IN MAIN CONTROL PANELS

Addressees:

All holders of a nuclear power reactor operating license (OL) or construction permit (CP).

Purpose:

This information notice is provided as an early notification of a potentially significant problem pertaining to welds in main control panels supplied by Systems Control of Iron Mountain, Michigan; Reliance Electric of Stone Mountain, Georgia; and Comsip of Linden, New Jersey, to a number of operating plants and construction sites. The potential safety significance of this problem is still under review by the Nuclear Regulatory Commission (NRC) staff. If NRC evaluation so indicates, further licensee action may be requested. In the interim, the staff expects licensees to review the information herein for applicability to their facilities. No specific action or response is required at this time.

Description of Circumstances:

Inspections at the vendors' facilities have disclosed numerous welding practices not in accordance with the American Welding Society (AWS) Standards and several quality assurance practices not in compliance with the vendors' procedures or NRC requirements. Among these were the following:

1. Certified material test reports not required, not available, or not in accordance with AWS specifications
2. Changes to drawings not properly reviewed and accepted
3. Welding being done by unqualified individuals without qualified procedures and using uncalibrated equipment
4. Poor welds, including lack of fusion, undercuts in excess of 1/32" and weld wire remnants from 1/2" to 4" in accepted welds
5. Welding procedure qualification and welder qualification testing required by AWS Standards not accomplished
6. Essential variables as specified by AWS Standards violated
7. Management oversight not accomplished for lengthy periods; lack of separate review and approval for Quality Assurance
8. Unidentified weld filler metal used
9. Gas tungsten arc welding (GTAW) process used but not documented in place of required gas metal arc welding (GMAW) or shielded metal arc welding (SMAW) processes

Since the inspection determined that the non-conforming practices of all three vendors are similar and widespread at each manufacturing facility, it can be assumed that any panel from these vendors may have defective welds. Although the vendors have seismically qualified similar panels, their current welding practices and resultant defective welds may affect the validity of those qualifications.

Sites at which defective welds in control panels have been identified are Byron-1 and 2, Braidwood 1 and 2, Midland 1 and 2, Vogtle 1 and 2, Callaway 1, Comanche Peak 1 and 2, and Waterford 3.

Sites which have received panels which may have defective welds are as follows: Wolf Creek; Brunswick 1 and 2; Seabrook; Palo Verde 1, 2, and 3; Susquehanna; Three Mile Island 1; Salem 1 and 2; Hope Creek; Monticello; Perry 1 and 2; Hatch 1 and 2; Indian Point 2; Shearon Harris 1, 2, 3, and 4; St. Lucie 2; Shoreham; Virgil Summer; Marble Hill 1 and 2; Dresden; LaSalle; Clinton; Beaver Valley; and Millstone.

If you have any questions regarding this matter, please contact the administrator of the appropriate Regional Office or this office.

S/ Edward Jordan

Edward L. Jordan, Director
Division of Engineering and
Quality Assurance
Office of Inspection and Enforcement

Technical Contact: M. S. Wegner
301-492-4511

Attachment:
List of Recently Issued IE Information Notices

LIST OF RECENTLY ISSUED
IE INFORMATION NOTICES

| Information Notice No. | Subject | Date of Issue | Issued to |
|------------------------|---|---------------|--|
| 82-33 | Control of Radiation Levels in Unrestricted Areas Adjacent to Brachytherapy Patients | 8/20/82 | All Medical Institutions |
| 82-32 | Contamination of Reactor Coolant System by Organic Cleaning Solvents | 8/19/82 | All power reactor facilities holding an OL or CP |
| 82-31 | Overexposure of Diver During Work in Fuel Storage Pool | 7/28/82 | All power reactor facilities holding an OL or CP |
| 82-30 | Loss of Thermal Sleeves in Reactor Coolant System Piping at Certain Westinghouse PWR Power Plants | 7/26/82 | All power reactor facilities holding an OL or CP and applicants for operating license (NTOL) |
| 82-29 | Control Rod Drive (CRD) Guide Tube Support Pin Failures at Westinghouse PWRs | 7/23/82 | All power reactor facilities holding an OL or CP Westinghouse-designed NSSS |
| 82-28 | Hydrogen Explosion While Grinding in the Vicinity of Drained and Open Reactor Coolant System | 7/23/82 | All power reactor facilities holding an OL or CP |
| 82-26 | RCIC and HPCI Turbine Exhaust Check Valve Failures | 7/23/82 | All BWR power reactor facilities holding an OL or CP |
| 82-25 | Failures of Hiller Actuators upon Gradual Loss of Air Pressure | 7/22/82 | All power reactor facilities holding an OL or CP |
| 82-24 | Water Leaking from Uranium Hexafluoride Overpacks | 7/20/82 | All NRC-licensed enriched uranium fuel fabrication plants |

OL = Operating License
CP = Construction Permit

OCTOBER 22 1982

Docket Nos. 50-445/446, 50-528/529/530, STN50-483
50-322, 50-395, 50-387/388, 50-382
and 50-330

MEMORANDUM FOR: The Atomic Safety & Licensing Boards for:

Comanche Peak Steam Electric Station, Units 1 & 2
Callaway Plant, Unit 1
Palo Verde Nuclear Generating Station, Units 1/2/3
Shoreham Nuclear Power Station, Unit 1
Waterford Steam Electric Station, Unit 3
Midland Power Station, Units 1 & 2

and The Atomic Safety & Licensing Appeal Boards for:

Virgil C. Summer Nuclear Station, Unit 1
Susquehanna Steam Electric Station, Units 1 & 2
Waterford Steam Electric Station, Unit 3

FROM: Thomas M. Novak, Assistant Director
for Licensing
Division of Licensing, ONRR

SUBJECT: BOARD NOTIFICATION - WELDS IN MAIN CONTROL PANELS
(Board Notification No. 82-90A)

In accordance with present NRC procedures regarding Board Notifications, the enclosed information is being provided for your information as constituting new information relevant and material to safety issues. This information is generic and may have applicability to all dockets with control panels supplied by Systems Control of Iron Mountain, Michigan; Reliance Electric of Stone Mountain, Georgia; and Comsip of Linden, New Jersey.

This information notice provides additional information and clarification of welding deficiencies in main control panels which were the subject of an earlier Board Notification, 82-90. The potential safety significance of this item is still under review by the NRC staff.

Original signed by:
Thomas M. Novak

Thomas M. Novak, Assistant Director
for Licensing
Division of Licensing

Enclosure:
As stated

cc: Licensee/Board Service List

DISTRIBUTION OF BOARD NOTIFICATION

Callaway Unit 1
Docket No. STN 50-483 OL

James P. Gleason, Esq.
Mr. Glenn O. Bright
Dr. Jerry R. Kline
Mr. John G. Reed
A. Scott Cauger, Esq.
Barbara Shull
Marjorie Reilly
Gerald Charnoff, Esq.
Dan I. Bolef
Donald Bollinger
Mr. Fred Luekey
Mayor Howard Steffen
Professor William H. Miller
Robert G. Wright
Kenneth M. Chackes
Mr. Earl Brown
Mr. Samuel J. Birk
Mr. Harold Lottman
Eric A. Eisen, Esq.

Comanche Peak Units 1&2
Docket Nos. 50-445/446

Alan S. Rosenthal, Esq.
Dr. W. Reed Johnson
Thomas S. Moore, Esq.
Marshall E. Miller, Esq.
Dr. Kenneth A. McCollom
Dr. Richard Cole
Lucinda Minton, Esq.
Mrs. Juanita Ellis
David J. Preister, Esq.
Nicholas S. Reynolds, Esq.
Mr. Lanny Alan Sinkin

Midland Units 1&2
Docket Nos. 50-329/330

Christine N. Kohl, Esq.
Dr. John H. Buck
Charles Bechhoefer, Esq.
Dr. Jerry Harbour
Dr. Frederick P. Cowan
Mr. James R. Kates
Mr. Frank J. Kelley
Ms. Mary Sinclair
Michael I. Miller, Esq.
James E. Brunner, Esq.

Midland - cont.

Ms. Barbara Stamiris
Wendell H. Marshall
T. J. Creswell
Lee L. Bishop, Esq.
Steve J. Galder, P.E.
Mr. Wayne Hearn
Myron M. Cherry, P.C.
Frederick C. Williams

Palo Verde Units 1,2&3
Docket Nos. 50-528/529/530

Robert M. Lazo, Esq.
Dr. Richard F. Cole
Dr. Dixon Callihan
Arthur C. Gehr, Esq.
Rand L. Greenfield
Ms. Lee Hourihan
Lynne Bernabei, Esq.

Shoreham Unit 1
Docket No. 50-322

Lawrence Brenner, Esq.
Dr. James L. Carpenter
Dr. Peter A. Morris
Matthew J. Kelly, Esq.
Daniel F. Brown, Esq.
Ralph Shapiro, Esq.
Howard L. Blau, Esq.
W. Taylor Reveley, III, Esq.
Cherif Sekdy, Esq.
Stephen B. Latham, Esq.
Herbert H. Brown, Esq.
Edward M. Barrett, Esq.
Mr. Brian McCaffrey
Marc W. Goldsmith
David H. Gilmartin, Esq.
Mr. Jeff Smith
MHB Technical Associates
Hon. Peter Cohalan
Mr. Jay Dunkleberger

Waterford Unit 3
Docket No. 50-382

Stephen F. Eilperin, Esq.
Dr. Reginald L. Gotchy
Christine N. Kohl, Esq.
Sheldon J. Wolfe, Esq.
Dr. Walter H. Jordan
Dr. Harry Foreman
E. Blake, Esq.
Mr. Gary L. Groesch
Luke B. Fontana, Esq.
Malcolm Stevenson, Esq.
Linda B. Watkins, Esq.
William J. Guste, Jr., Esq.

Atomic Safety and
Licensing Board Panel
Atomic Safety and
Licensing Appeal Panel
Docketing and Service
Section
Document Management Branch

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Applied Science
Princeton University
Princeton, NJ 08540

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Knoxville, TN 37922

Dr. Max W. Carbon, Chairman
Nuclear Engineering Department
Engineering Research Building
University of Wisconsin
Madison, WI 53706

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Mr. Harold Etherington
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Engineering
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Ann Arbor, MI 48109

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Santa Barbara, CA 93106

Dr. J. Carson Mark
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Theoretical Division
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Los Alamos, NM 87545

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Los Angeles, CA 90024

Dr. Milton S. Plesset
California Inst. of Technology
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Pasadena, CA 91109

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819 Lantern Lane
Langhorne, PA 19047

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2477 Lytham Road
Columbus, OH 43220

Dr. Chester P. Siess
805 Hamilton Drive
Champaign, IL 61820

Mr. David A. Ward
E.I. du Pont de Nemours &
& Company
Savannah River Laboratory
Building 773-A, A-219
Aiken, SC 29808

DISTRIBUTION FOR BOARD NOTIFICATION

Summer Unit 1
Docket No. 50-395

Alan S. Rosenthal, Esq.
Howard A. Wilber, Esq.
Christine N. Kohl, Esq.
Herbert Grossman, Esq.
Mr. Gustave A. Linenberger
Dr. Frank F. Hooper
George Fischer, Esq.
Richard P. Wilson, Esq.
Mr. John Ruoff
Brett Allen Bursley
Joseph B. Knotts, Esq.
Randolph R. Mahan, Esq.

Susquehanna Units 1&2
Docket Nos. 50-387/388

Thomas S. Moore, Esq.
Dr. John H. Buck
Stephen F. Eilperin, Esq.
James P. Gleason, Esq.
Mr. Glenn O. Bright
Dr. Paul W. Purdom
Jay Silberg, Esq.
Bryan A. Snapp, Esq.
Dr. Judith H. Johnsrud
Mr. Thomas M. Gerusky
Ms. Colleen Marsh
Mr. Thomas J. Halligan
Mr. DeWitt C. Smith
G. Rhodes
Susquehanna Environmental
Advocates
Mr. Robert W. Adler

Atomic Safety and Licensing Board
Panel
Atomic Safety and Licensing Appeal
Panel
Docketing and Service Section
Document Management Branch

Waterford Unit 3
Docket No. 50-392

Stephen F. Eilperin, Esq.
Dr. Reginald L. Gotchy
Sheldon J. Wolfe, Esq.
Dr. Walter H. Jordan
Dr. Harry Foreman
E. Blake, Esq.
Mr. Gary L. Groesch
Luke B. Fontana, Esq.
Malcolm Stevenson, Esq.
Linda B. Watkins, Esq.
William J. Guste, Jr., Esq.

ACRS Members

Dr. Robert C. Axtmann
Mr. Myer Bender
Dr. Max W. Carbon
Mr. Jesse C. Ebersole
Mr. Harold Etherington
Dr. William Kerr
Dr. Harold W. Lewis
Dr. J. Carson Mark
Mr. William M. Mathis
Dr. Dade W. Moeller
Dr. David Okrent
Dr. Milton S. Plesset
Mr. Jeremish J. Ray
Dr. Paul G. Shewmon
Dr. Chester P. Sless
Mr. David A. Ward

Since the inspection determined that the non-conforming practices of all three vendors were similar and widespread at each manufacturing facility, it can be assumed that any panel furnished by these vendors prior to the respective NRC inspection dates may have defective welds. Although the vendors have seismically qualified similar panels, improper welding practices and defective welds prior to the NRC inspection may affect the validity of those qualifications. R1
R1
R1
R1
R1

Some control panels were identified during vendor inspections as having defective welds. Sites which have received panels that may have defective welds are as follows: Palo Verde 1, 2, and 3; Byron 1 and 2; Braidwood 1 and 2; Midland 1 and 2; Vogtle 1 and 2; Callaway 1; Comanche Peak 1 and 2; Waterford 3; Wolf Creek; Brunswick 1 and 2; Seabrook; Susquehanna; Three Mile Island 1; Salem 1 and 2; Hope Creek; Monticello; Perry 1 and 2; Hatch 1 and 2; Indian Point 2; Shearon Harris 1, 2, 3, and 4; St. Lucie 2; Shoreham; Virgil Summer; Dresden; and LaSalle. R1
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If you have any questions regarding this matter, please contact the administrator of the appropriate Regional Office or this office.

Edward L. Jordan, Director
Division of Engineering and
Quality Assurance
Office of Inspection and Enforcement

Technical Contact: M. S. Wegner
301-492-4511

Attachment:
List of Recently Issued IE Information Notices

LIST OF RECENTLY ISSUED
 IE INFORMATION NOTICES

| Information Notice No. | Subject | Date of Issue | Issued to |
|------------------------|--|---------------|---|
| 82-37 | Cracking in the Upper Shell to Transition Cone Girth Weld of a Steam Generator at an Operating Pressurized Water Reactor | 9/16/82 | All power reactor facilities holding an OL or CP |
| 82-36 | Respirator Users Warning for Certain 5-Minute Emergency Escape Self-Contained Apparatus | 9/2/82 | All power reactor facilities holding an OL or CP, fuel facilities and Priority I material licensees |
| 82-35 | Failure of Three Check Valves on High Pressure Injection Lines to Pass Flow | 8/25/82 | All power reactor facilities holding an OL or CP |
| 82-34 | Welds in Main Control Panels | 8/25/82 | All power reactor facilities holding an OL or CP |
| 82-33 | Control of Radiation Levels in Unrestricted Areas Adjacent to Brachytherapy Patients | 8/20/82 | All Medical Institutions |
| 82-32 | Contamination of Reactor Coolant System by Organic Cleaning Solvents | 8/19/82 | All power reactor facilities holding an OL or CP |
| 82-31 | Overexposure of Diver During Work in Fuel Storage Pool | 7/28/82 | All power reactor facilities holding an OL or CP |
| 82-30 | Loss of Thermal Sleeves in Reactor Coolant System Piping at Certain Westinghouse PWR Power Plants | 7/26/82 | All power reactor facilities holding an OL or CP and applicants for operating license (NTOL) |
| 82-29 | Control Rod Drive (CRD) Guide Tube Support Pin Failures at Westinghouse PWRs | 7/23/82 | All power reactor facilities holding an OL or CP Westinghouse-designed NSSS |

OL = Operating License
 CP = Construction Permit

OCT 06 1982

Docket: 50-445/82-19

Texas Utilities Generating Company
ATTN: Mr. R. J. Gary, Executive Vice
President and General Manager
2001 Bryan Tower
Dallas, Texas 75201

Gentlemen:

This refers to the inspection conducted by Mr. D. P. Tomlinson of our staff on September 7-13, 1982, of activities authorized by NRC Construction Permits CPPR-126 and CPPR-127 for the Comanche Peak facility, Units 1 and 2, and to the discussion of our findings with members of your staff at the conclusion of the inspection.

Areas examined during the inspection and our findings are documented in the enclosed inspection report. Within these areas, the inspection consisted of selective examination of procedures and representative records, interviews with personnel, and observations by the inspector.

Within the scope of the inspection, no violations or deviations were identified.

One new unresolved item is identified in paragraph 3 of this report.

In accordance with 10 CFR 2.790(a), a copy of this letter and the enclosure will be placed in the NRC Public Document Room unless you notify this office, by telephone, within 10 days of the date of this letter and submit written application to withhold information contained therein within 30 days of the date of this letter. Such application must be consistent with the requirements of 2.790(b)(1).

Texas Utilities Generating Company 2

Should you have any questions concerning this inspection, we will be pleased to discuss them with you.

Sincerely,

G. L. Madsen, Chief,
Reactor Project Branch 1

Enclosure:
Appendix _ NRC Inspection Report 50-445/82-19

cc w/enclosure:
Texas Utilities Generating Company
ATTN: H. C. Schmidt, Project Manager
2001 Bryan Tower
Dallas, Texas 75201

APPENDIX

U. S. NUCLEAR REGULATORY COMMISSION
REGION IV

NRC Inspection Report: 50-445/82-19

Docket: 50-445

Category A2

Licensee: Texas Utilities Generating Company
2001 Bryan Tower
Dallas, Texas 75201

Facility Name: Comanche Peak, Unit 1

Inspection at: Comanche Peak Steam Electric Station

Inspection conducted: September 7-13, 1982

Inspector: *Robert P. Harrison* 9-28-82
R. P. Harrison, Reactor Inspector, Engineering Section Date

Reviewed: *F. J. Westerman* 9-28-82
F. J. Westerman, Chief, Reactor Project Section A Date

Approved: *D. M. Hunnicutt* 9/28/82
D. M. Hunnicutt, Chief, Engineering Section Date

Inspection Summary

Inspection Conducted September 7-13, 1982 (Report 50-445/82-19)

Areas Inspected: Routine unannounced inspection of construction activities including a site tour, review of procedures, review of quality records, observation of work in progress and review of isometric drawings of components and piping examined during the Unit 1 preservice inspection. Also examined were the licensee actions taken in response to IE Information Notice No. 82-34, "Welds in Main Control Panels." This inspection involved 36 inspector-hours by one NRC inspector.

Results: Within the three areas inspected, no violations or deviations were identified.

DETAILS1. Persons ContactedPrincipal Licensee Employees

- R. G. Tolson, Site QA Supervisor
- *C. T. Brandt, QA/QC Supervisor - Mechanical/Civil
- R. A. Perry, Quality Engineer, Preservice Inspection
- *R. M. Kissinger, Project Civil Engineer, TUSI

Other Personnel

- D. Gulling, Preservice Inspection Coordinator, Westinghouse
- N. Bollingmo, Level II Inspector, Westinghouse
- J. Delbusso, Level I Inspector, Westinghouse

*Denotes those attending the exit interview on September 10, 1982.

The NRC inspector also contacted other licensee and contractor personnel during the course of the inspection.

2. Site Tour

The NRC inspector toured the Units 1 and 2 reactor building, auxiliary buildings and one warehouse to observe work in progress, inspect completed work, inspect received materials, and observe general housekeeping conditions.

Within the areas inspected, no violations or deviations were identified.

3. Followup on Information Notice 82-34

Information Notice 82-34, dated August 20, 1982, was sent to all holders of a power reactor operating license or construction permit as early notification of a potentially significant problem. Inspections at three vendors facilities disclosed numerous welding practices not in accordance with the American Welding Society (AWS) standards and several quality assurance practices not in compliance with the vendors procedures or NRC requirements.

The NRC inspector, accompanied by a TUGCO QA/QC supervisor, toured the Unit 1 control room and performed a visual inspection of the welding inside eight of eleven installed control panels. Not all welds could be inspected as cables had been installed and the panels were energized. It was apparent that TUGCO had previously performed an examination as the QA/QC supervisor knew the location of several weld discrepant conditions and readily pointed them out to the NRC inspector.

Lack of fusion, undercutting, excessive weld spatter, apparent incomplete welding, and weld wire remnants attached to the panel welds were among the anomalies noted. Not all of these conditions were noted on each weld or each panel.

No specific action or response was required of the licensee at the time the Information Notice was issued. The licensee is, however, presently evaluating the reportability of this matter under the provisions of 10 CFR Part 50. 55(e). Until future actions are taken by the licensee, this will be considered an unresolved item.

4. Preservice Inspection - Unit 1

The NRC inspector reviewed the Westinghouse "Examination Program Plan for Comanche Peak Nuclear Power Plant Unit 1 - Preservice examination Program." Each Class 1 and Class 2 component requiring examination and the type and extent of examination to be performed was clearly specified. Exceptions to the required examinations were identified and the reason for each was referenced in the program plan. Approval signatures by the licensee and the American Nuclear Insurers, Inc. (ANII) indicated that both parties had reviewed and approved the program.

The NRC inspector reviewed the personnel qualification records for sixteen of the inspectors involved with the preservice inspection. Eight Level I and eight Level II personnel folders indicated that each inspector had sufficient experience and specialized education to satisfactorily perform the examinations required. Each inspector's file also contained records of satisfactory visual acuity and color discrimination tests within the last year. Informal interviews with four of these inspectors indicated that each has a thorough knowledge of the inspection methods used and the procedures governing the examinations.

The NRC inspector verified that six of the ultrasonic instruments in use displayed valid and current calibration stickers. The material certifications for one batch of ultrasonic couplant (Sonotrace 40 Batch #8124); four batches of penetrant material (81L054, 81J116, 81L071, 80A032); four batches of cleaner (82A080, 81M038, 82D053, 81H066); and six batches of developer (81J098, 82A007, 81M001, 82D056, 80B014, 80E111) were reviewed and found to meet the requirements for residual sulfur and halogens.

In addition, the NRC inspector reviewed Westinghouse Procedures OPS-NSD-101, ISI-11, ISI-47, ISI-70, and ISI-206 for adequacy and for compliance to the requirements of ASME B&PV Code, Section XI. These procedures cover inservice inspection utilizing magnetic particle, liquid penetrant, and ultrasonic examinations performed on ASME Class 1 and Class 2 components. Each procedure contained the personnel and equipment requirements, calibration requirements, component surface condition, component temperature, evaluation and reporting requirements.

The NRC inspector witnessed the 0°, 45°, and 60° ultrasonic examination of one circumferential weld joint on Steam Generator No. 3. This was identified as weld No. 8 on isometric drawing TBX-2-110. The examination was performed in accordance with Procedure ISI-47 by two inspectors certified to the Level I and Level II requirements of SNT-TC-1A. The original calibration of the ultrasonic system was not observed, but the NRC inspector verified that postinspection amplitude calibration check was within 2 decibels of the recorded calibration and that there had been no sweep shift. The NRC inspector observed two other certified inspection personnel perform the ultrasonic examination of welded joint No. 13 as shown on isometric drawing TBX-1-4200. This is the elbow-to-piping weld on the loop 2 cold leg of the reactor coolant system (RCS) piping. Although the postexamination calibration check was within the established limits and the screen presentation was good, the two examination scans on the RCS piping could not be verified as having adequate material penetration. With the ultrasonic instrument sensitivity increased from calibration gain setting to the scan gain setting, only a sporadic back reflection could be identified. Adequate longitudinal wave penetration is normally gauged by the presence or absence of the far-surface back reflection. Additionally, the low transducer frequency and elevated amplitude, due to the increased gain for the examination, saturated the cathode ray tube (CRT) screen for approximately half of the sweep range. With this CRT saturation, no indications in the first half of the piping thickness could be identified or evaluated. Fourteen joints on each of the four RCS loops were examined utilizing a 0° longitudinal beam and a 41° refracted longitudinal beam. Conversations with several of the inspection personnel indicated that these conditions were common to all of the RCS piping welds. The four loops were fabricated from centrifugally cast stainless steel which is notoriously difficult to ultrasonically inspect due to its extremely large and irregular grain structure. Although differences of opinion as to the validity of ultrasonic inspection results have been expressed by many cognizant organizations and individuals, this remains the only inservice volumetric examination possible. Prior to this preservice ultrasonic examination, each of the piping joints was radiographically inspected and found to be acceptable. Subsequent radiography will not be possible due to the lack of access to the inside of the pipe and the wall thickness of the components. No magnetic particle (MP) or liquid penetrant (LP) examinations were observed by the NRC inspector. MP and LP had been completed on all Class 1 and Class 2 components prior to the beginning of this inspection.

The NRC inspector randomly selected a sample from the preliminary inspection results sheets for review. This sample included records for magnetic particle, liquid penetrant, and ultrasonic inspections. Each data sheet identified the component being examined, the inspection method used, identification and level of the inspection personnel, and identification of the materials or instrumentation used. For all inspections, the temperature of the item examined was recorded and for ultrasonic inspection, the temperature of the calibration standard was also recorded. Calibration data sheets were included for each examination performed and each identified

the standard used and the indication amplitudes achieved. The NRC inspector reviewed the records for approximately 200 ultrasonic inspections and approximately 400 surface examinations. The records for each were complete, thorough, and easily traceable to the individual welds inspected.

Within the areas inspected, no violations or deviations were identified.

5. Unresolved Items

Unresolved items are matters about which more information is required in order to ascertain whether they are acceptable items, violations or deviations. One unresolved item identified during this inspection is discussed in paragraph 3.

6. Exit Interview

An exit interview was conducted September 10, 1982, with those persons listed in paragraph 1. At this interview, the NRC inspector discussed the scope of this inspection and the findings.

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